XV. Observations upon the structural Character of the Death Watch (Atropos pulsatoria), with Description of a new British Genus in the Family to which it belongs. By J. O. Westwood, Esq., F.L.S., &c.

[Read February, 1840.]

Having had occasion to remark in my Introduction to the Modern Classification of Insects, that the species of the family Psocidæ require a more minute investigation than had previously been given to them, and having been compelled, from an examination of my own collection, to establish a new genus, and at the same time to remark that the genus Cæcilius of Curtis appeared to be founded upon a sexual character, I consider myself fortunate in being able to lay before the Society a notice of some other interesting modifications of structure occurring in the family. Mr. Curtis and myself have observed that the antennæ in this family consist of about thirteen joints. Dr. Burmeister, in the new part of his Handbuch, however, describes the antennæ of Atropos (which name he changes to Troctes) as having only ten joints, and that of Psocus and his new genus Thyrsophorus, as possessing only eight joints, observing of the former of these genera, "J. Curtis giebt 13 gleider an, ich sah nie mehr als 8," (p. 775, note). The careful examination which I made of numerous individuals of the genus Psocus convinces me that there are thirteen joints in the antennæ, whilst the antennæ of the Atropos pulsatoria are 15-jointed, as I have ascertained by a careful examination of many living specimens of various sizes, in which also the labial as well as the maxillary palpi are exserted, although Burmeister says "die Lippentaster fehlen." It is therefore important to ascertain with precision the Atropos pulsatoria, and its very common occurrence in neglected boxes of insects enables us at any time to examine it in a living state. Its principal characteristics consist in having the prothorax very short, the meso- and meta-thorax united into a square plate, the hind femora greatly incrassated, the tarsi 3-jointed, and the antennæ 15-jointed. I have represented it in my vol. 2, p. 18, fig. 59, 19. Now Burmeister's generic description agrees herewith, except in the number of joints of the antennæ. De Geer has also given a figure of this species, vol. 7, t. 4, f. 2, representing the quadrate meso- and meta-thorax and the thickened femora of the hind legs. Burmeister, however, does not quote these figures, but refers A. pulsatoria to De Geer's

third figure of this plate, which represents a totally different insect, belonging to a different genus, having four rudimental wings, slender legs, and uniform segments of the thorax, and which is, I apprehend, the pupa of a male Psocus, such as I have figured in my Introduction, fig. 59, 10. Burmeister in his generic character of Troctes (or Atropos) refers however to another figure of De Geer, (namely, tab. 4, fig. 1,) which represents an apterous specimen with uniform segments, with simple hind legs, and with long antennæ, which he describes as 18-jointed. This, however, is clearly distinct, both specifically and generically, from Atropos. Again, Burmeister refers to Latreille's figure of Psocus pulsatorius, given in Coquebert's Illustratio Iconographica, tab. 2, f. 14, but that figure is either inaccurate (representing the thoracic segments as very short and equal, and the hind legs simple) or the reference to it by Burmeister is incorrect.

But the more immediate object of this communication is to mention the discovery of a species possessing as many as twenty-seven joints in the antennæ, and as this species is a domestic one, I trust that the discovery will be deemed to possess an additional interest on that account. I have found it amongst books, crawling in fact over the pages of one of the volumes of Mr. Stephens's Illustrations, a circumstance I mention as in some degree showing it to be a native species, for had I found it on a newly received foreign work I might have doubted this. It is three times the size of Atropos pulsatoria. I have named it, after one of the Fates, Clotho, having used the name of Lachesis, or rather a diminutive thereof, for Psocus fatidicus, and the name of the third Fate, Atropos, having been given to Psocus pulsatorius.

CLOTHILLA.

Corpus parvum, apterum; capite subtriangulare (haud oblongoquadrato); thorace capite vix latiori, abdomine ovato, subconvexo.

Antennæ longæ, gracillimæ, articulis eirciter 27, duobus basalibus erassis. Prothorax segmentis aliis thoracicis brevior. Pedes simplices, tarsis 3-articulatis.

Clothilla studiosa, Westw.

Luteo-albida, oculis brunneis, antennis fuscis, labro albido, incisuris abdominis brunneis; pedibusque albidis.

Long. eorp. lin. 1.

Habitat in domu meâ, super libros cursitans.